

REMARKS

Applicant has carefully reviewed and considered the Final Office Action mailed on November 28, 2003, and the references cited therewith. Claims 13-27 and 29-44 are now pending in this application.

The Office Action indicates "Dawson states that 'a die attach thickness in the range of 10. mil +- 60% provides for good thermal conductance for chips dissipating heat ...'. Also, 1 mil = 25.54 μ m." (Office Action at page 2). The Office continues to mistake an adhesive layer, "die attach layer 330" (Dawson at column 6, about line 25), for the die itself, "... is attached to the integrated circuit chip 316 by a die attach layer 330 having a predetermined thickness." (Dawson at column 5, lines 23-24). The die attach layer 330 is not the die 316. The Office has committed a factual error by asserting that Dawson teaches a thinned die. This assertion should be withdrawn.

§102 Rejection of the Claims

Claims 13-27 and 29-44 were rejected under 35 USC § 102(b) as being anticipated by Applicant Admitted Prior Art (AAPA). Applicant respectfully traverses this rejection and requests the Office to consider the following.

First, this AAPA rejection represents new grounds for rejection, but the Office has imposed a Final Office Action, although there was no amendment since the previous Office Action. The imposition of a final rejection is therefore improper and should be withdrawn. M.P.E.P. §706.07(a).

Second, the Office Action fails to articulate reasoned grounds for rejection. 35 U.S.C. § 1.104(c)(2). Withdrawal of the rejections is respectfully requested.

Claims 13-27 and 29-44 were rejected under 35 USC § 102(b) as being anticipated by Dawson et al. (U.S. 5,621,615). Applicant respectfully traverses this rejection and requests the Office to consider the following.

"A claim is anticipated only if each and every element as set forth in the claim is found, either expressly or inherently described, in a single prior art reference." (*Verdegaal Bros. v.*

Union Oil Co. of California, 814 F.2d 628, 631, 2 USPQ2d 1051, 1053 (Fed. Cir. 1987), M.P.E.P. §2131, 8th Ed., Rev. 1).

Claim 13 requires "mounting a thinned semiconductor die on a planar surface of a heat spreader." The Office Action asserts "Dawson discloses a method of fabricating an integrated circuit package, comprising mounting a thinned semiconductor die etc." This is incorrect. Dawson neither teaches nor suggests his die is a thinned die. Consequently, Dawson neither expressly nor inherently describes the limitation of claim 13. Because Dawson does not anticipate claim 13, withdrawal of the rejection is respectfully requested.

Applicant notes that since claims 14-15 and 17-23 depend from claim 13, they are likewise not anticipated by Dawson. Withdrawal of the rejection is respectfully requested.

At page 3 the Office Action refers to claim 24, that "Dawson discloses a method of fabricating an integrated circuit package, comprising providing a planar heat spreader; mounting a plurality of thinned semiconductor dice 316, 318 etc." This is incorrect for at least two reasons. First as set forth above, Dawson neither teaches nor suggests his die is a thinned die. Second, Dawson's reference numeral 318 is incorrectly called a die at column 6, lines 27 and 28. But item 318 if first referred to thusly: " The integrated circuit chip 316 has a first major surface 318 and a second major surface 320" (Dawson at column 4, line 1, *et seq*). Accordingly, Dawson's second reference to item 318 is in error, as it the lead line that points to the chip 316. Any further reference to a plurality of conjoined microelectronic packages is also in error. Withdrawal of the rejection is respectfully requested.

At page 3, the Office Action refers to claim 32, that "Dawson discloses a method of fabricating an integrated circuit package, comprising mounting a thinned semiconductor die on a planar surface of a heat spreader, wherein the thinned semiconductor die has a thickness of no more than 100 μm etc." This is not correct. The only reference to a thickness is the "die attach thickness [is] in the range of 1.0 mil \pm 60%" (Dawson at column 6, lines 61-62). Accordingly, there is no reference in Dawson to a die thickness and the claims are not anticipated. Withdrawal of the rejection is respectfully requested.

Formal Drawings

Formal drawings are provided herewith. No amendments to the drawings have been made.

Conclusion

Applicant respectfully submits that the claims are in condition for allowance and notification to that effect is earnestly requested. The Examiner is invited to telephone Applicant's attorney, John Greaves at (801) 278-9171, or the below signed attorney to facilitate prosecution of this application.

If necessary, please charge any additional fees or credit overpayment to Deposit Account No. 19-0743.

Respectfully submitted,

CHENG-YI LIU ET AL.

By their Representatives,

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Date Jan. 13, 2004

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CERTIFICATE UNDER 37 CFR 1.8: The undersigned hereby certifies that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail, in an envelope addressed to: Mail Stop AF, Commissioner of Patents, P.O. Box 1450, Alexandria, VA 22313-1450, on this 14 day of January, 2004.

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Signature

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